CLAIMS

We Claim:

1. A method for constructing a decision support system comprising the following steps:

(a) identifying an investment decision;

(b) identifying potential investments;

(c) utilizing domain experts to identify needed information to evaluate each investment;

(d) using domain experts to identify how to calculate investment risks; and,

(e) constructing a Bayesian network based on information obtained in steps (a) through (d) .

2. A method as in claim 1 additionally comprising the following step:

(f) using domain experts to identify how to calculate reliability of information obtained in step (c).

3. A method as in claim 1 additionally comprising the following step:

(f) using domain experts to identify how to calculate transaction costs for investments.

4. A method as in claim 1 wherein step (c) includes the following substep:

(c.1) using domain experts to identify pertinent information to obtain about an investor in order to perform the investment decision.

5. A method as in claim 1 wherein step (c) includes the following substep:

(c.1) using domain experts to identify pertinent information to obtain about an investor in order to perform the investment decision, the pertinent information including at least one of the following:

investment time horizon,

risk toleration,

desired return,

available capital.

6. A method as in claim 1 wherein in step (b) identifying potential investments comprises the following substeps:

(b.1) identifying investment types; and,

(b.2) identifying particular investments with the investment types.

7. A decision support system for supporting investment decisions comprising:

a decision support engine; and,

a Bayesian network traversed by the decision support engine, the Bayesian network comprising:

an investment decision node identifying an investment decision,

potential investment nodes identifying potential investments, and

information nodes identifying information to be obtained, the information to be obtained being matched to potential investments, wherein reliability of the information is estimated.

8. A decision support system as in claim 7 additionally comprising:

a knowledge acquisition tool for building the Bayesian network.

9. A decision support system as in claim 7 wherein the information to be obtained includes additional information about the potential investments to be obtained from a database.

10. A decision support system as in claim 7 wherein the information to be obtained includes additional information to be obtained from a potential investor.

11. A decision support system as in claim 7 wherein the information to be obtained includes additional information to be obtained from a potential investor, including at least one of the following:

investment time horizon;

risk toleration;

desired return;

available capital.

12. A decision support system for supporting investment decisions comprising:

a decision support engine; and,

a Bayesian network traversed by the decision support engine, the Bayesian network comprising:

an investment issue node identifying an investment issue,

investment type nodes identifying investment types,

investment nodes identifying investments available within investment types, and

information nodes identifying information to be obtained, the information to be obtained being matched to investment nodes, wherein reliability of the information is estimated.

13. A decision support system as in claim 12 additionally comprising:

a knowledge acquisition tool for building the Bayesian network.

14. A decision support system as in claim 12 wherein the information to be obtained includes additional information about the investments to be obtained from a database.

15. A decision support system as in claim 12 wherein the information to be obtained includes additional information to be obtained from a potential investor.

16. A decision support system as in claim 12 wherein the information to be obtained includes additional information to be obtained from a potential investor, including at least one of the following:

investment time horizon;
risk toleration;
desired return;
available capital.